

CLAIM AMENDMENTS

1. (currently amended) A system for controlling transmission of data packets through an information network, each data packet comprising a content portion, a header, and a trailer, said system comprising:

a Regional Transaction Processor (RTP); and

coupled to the RTP, a data Enabling Device (DED) containing content match information and operable to:

receive one or more data packets from the information network[[],];

detect when the one or more information within the content portions of a data packets include is substantially similar to content match information[[],];

and

when information within the content portion of a data packet is substantially similar to content match information, issue initiate issuance of a message to a user workstation and invoke the RTP to process a transaction when the content match information is detected in the one or more data packets, wherein the DED is operable to prevent further transmission of the one or more data packets based on the content match information.

2. (currently amended) The system as set forth in claim 1, wherein the transaction processed is based on control information associated with the content match information.

3. (currently amended) The system[[],] as set forth in claim 1[[],] wherein the DED is operable to detect when the one or more data packets include content match information at a rate proportional to the rate at which the data packets are received by the DED.

4. (canceled)

5. (currently amended) The system[[,]] as set forth in claim 1[[,]] wherein the RTP comprises a network server and a database, and is operable to process ~~transactions~~ for requests for content.

6. (original) The system, as set forth in claim 1, wherein the DED is located at a network access point (NAP).

7. (original) The system, as set forth in claim 1, further comprising a plurality of DEDs along a network route, wherein each DED is operable to communicate with at least one of the other DEDs.

8. (currently amended) The system[[,]] as set forth in claim 7[[,]] wherein the plurality of DEDs include a first DED that generates a message and at least one ~~or more~~ intermediate DED[[s]] operable to forward the message to the DED closest to the user workstation along the network route.

9. (original) The system, as set forth in claim 7, wherein the plurality of DEDs are operable to communicate with each other to prevent transmitting more than one message for the same data packet through the network route.

10. (currently amended) The system, as set forth in claim 1, wherein the RTP transmits a Release_Content or Cease_Content message to the DED, based on whether ~~the at least one~~ a data packet was authorized to be downloaded to the workstation.

11. (original) The system, as set forth in claim 1, wherein the DED includes Field Programmable Gate Arrays (FPGAs).

12. (currently amended) The system[[,]] as set forth in claim 11[[,]] wherein the FPGAs ~~can be~~ are reprogrammed over the network to perform a content matching function.

13. (currently amended) The system[[,]] as set forth in claim 11[[,]] wherein a portion of the DED ~~can be~~ is dynamically reprogrammed, and the DED is operable to continue processing ~~the~~ data packets during the partial dynamic reprogramming.

14. (original) The system, as set forth in claim 1, further comprising a Central Storage and Backup System (CSBS) operable to communicate with the RTP, to monitor operation of the RTP, and to store transaction information.

15. (original) The system, as set forth in claim 14, wherein the CSBS is operable to transmit information to reprogram the DED to communicate with another RTP.

16. (original) The system, as set forth in claim 1, further comprising a content matching server operable to store content match information, to communicate with the DED, and to transmit the content match information to the DED.

17. (currently amended) The system[[,]] as set forth in claim 1[[,]] wherein the DED is operable to suspend transmission of ~~the~~ data packets through the information network until a user response to a prompt is received.

18. (currently amended) A method for controlling transmission of identifiable content over an information network, said method comprising:

providing content match information for the content to a DED, wherein the DED is located in the information network along a transmission path of a plurality of data packets, each data packet having a header, a content portion, and a trailer ~~wherein at least one data packet includes the content match information;~~
~~receiving the at least one data packets in the DED; and~~

~~detecting the looking for content match information in content portions of the at least one data packets in the DED; and~~
~~issuing a prompt to a workstation based on the content match information when the content match information is detected in the at least one a content portion of a data packet[[:]], issuing a prompt to a user workstation and preventing further transmission of the one or more data packets based on the content match information.~~

19. (currently amended) The method as set forth in claim 18, wherein the prompt is based on control information associated with the content match information.

20. (canceled)

21. (original) The method, as set forth in claim 18, further comprising: processing a transaction based on a user's response to the prompt.

22. (original) The method, as set forth in claim 18, further comprising transmitting a message among a plurality of DEDs along the transmission path to prevent transmitting more than one prompt for the same data packet.

23. (currently amended) The method[[,]] as set forth in claim 18, further comprising: processing a transaction based on the content match information a user response to the prompt, and transmitting a Release_Content or Cease_Content message to the DED based on whether content was authorized to be downloaded to the workstation during as part of the transaction.

24. (original) The method, as set forth in claim 18, further comprising: reprogramming a portion of the DED to detect different content match information.

25. (currently amended) The method[[],] as set forth in claim 18, further comprising suspending transmission of ~~the at least one a~~ data packet through the information network until a user response to the prompt is received.

26. (original) A computer program product comprising:
program instructions to implement the method of claim 18.

27. (original) A data signal comprising:
program instructions to implement the method of claim 18.

28. - 53. (canceled)

54. (currently amended) The system[[],] as set forth in claim 1[[],] wherein the DED is further operable to search ~~the~~ data packets for ~~the~~ content match information to determine whether transmission of data packets ~~associated with a~~ containing particular piece of content should be ~~restricted~~, and, if transmission of associated data packets is ~~restricted~~, then ~~control information is used by the RTPs to determine which transaction(s) to process to control transmission of data packets prevented, and when the DED finds such content match information, the DED prevents further transmission of data packets containing said particular content, without additional processing.~~

55. (currently amended) The system[[],] as set forth in claim 1, wherein a content provider supplies transaction instructions to ~~be used in the RTP for use~~ when the DED ~~matches~~ ~~the finds~~ content match information in a data packet.

56. (currently amended) The system[[],] as set forth in claim 55, wherein the instructions include transmitting a transaction prompt to the user workstation informing ~~a user~~ of a price to ~~paid pay~~ for content in the packets, and allowing the user to accept or decline purchase of the content.

57. (previously presented) The system, as set forth in claim 55, wherein the instructions specify transmitting a prompt to inform a user that content infected with a virus is attempting to be transmitted from or received by the workstation and that transmission or reception of the virus is being halted.

58. (currently amended) The system[[,]] as set forth in claim 55[[,]] wherein the instructions include ~~specify~~ transmitting a prompt to the user workstation to inform ~~a user~~ that content subject to security control is attempting to be transmitted from or received to the user[['s]] workstation 114, and that transmission or reception of the ~~confidential~~ content is being halted.

59. (currently amended) The system as set forth in claim 55, wherein ~~As further example, the RTP 128 can tally tallies statistics regarding transmission of designated content for purposes such as rating the popularity of the content.~~